

FIG. 2A

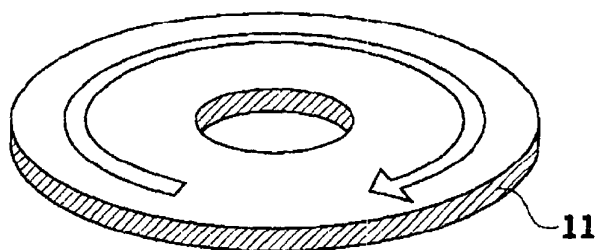


FIG. 2B

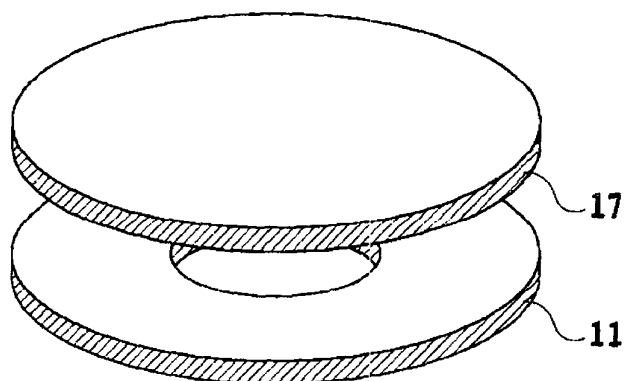


FIG. 2C

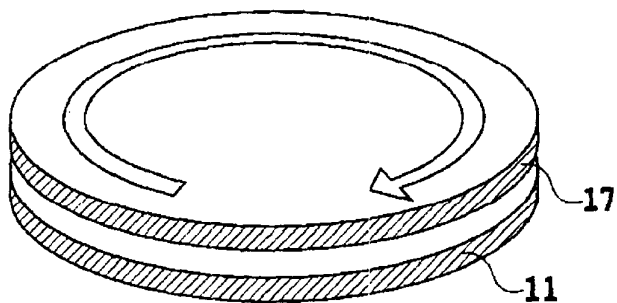
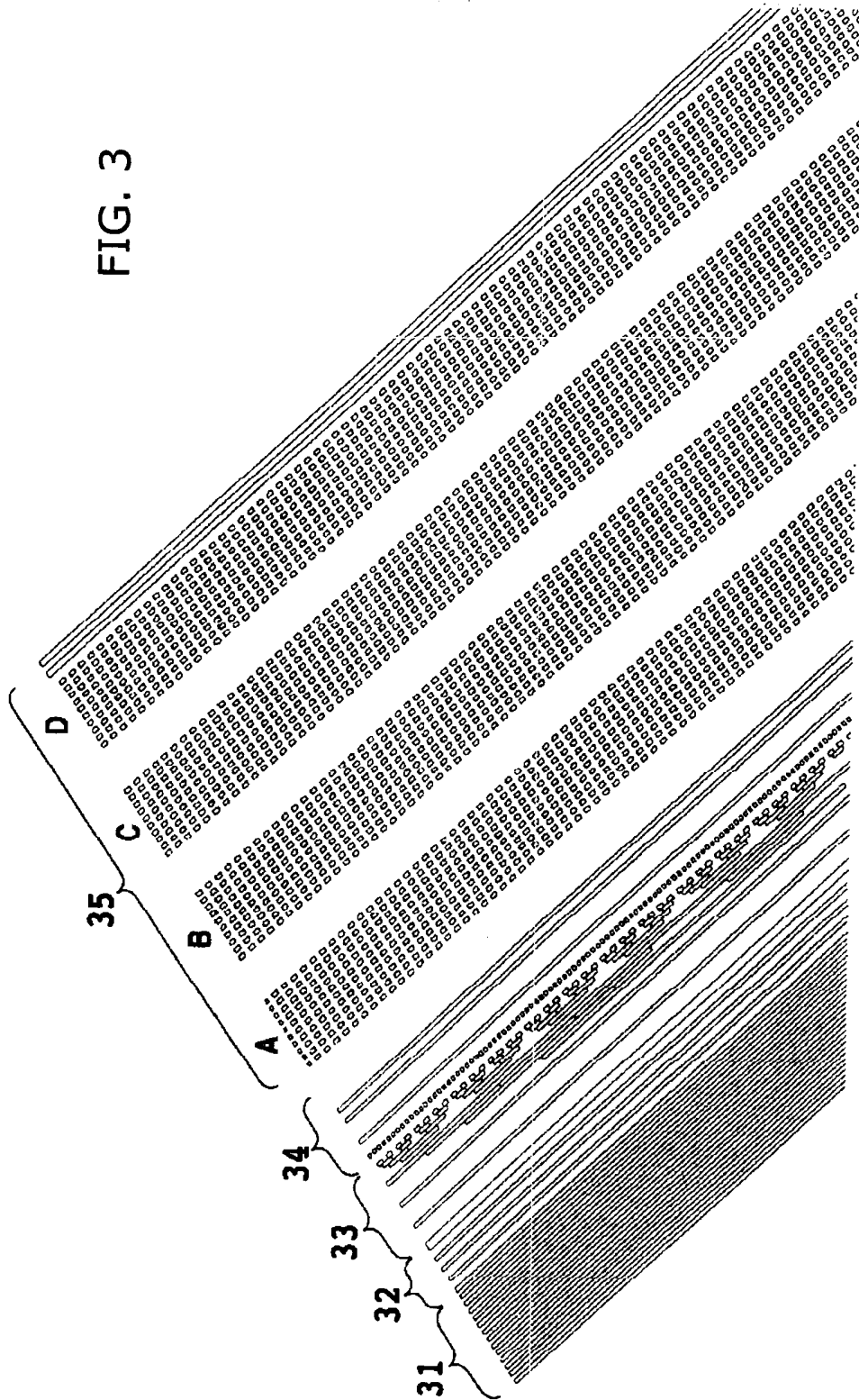


FIG. 3



19-bit Cylinder ID(binary coded)		19-bit Cylinder ID(gray coded)	
binary	Gray		
0 1 2 3	0 1 2 3	0 0 0 0 0 0 0 0 1 1 1 1 1 1 1 1 1	0 0 0 0 0 0 0 0 0 1 1 1 1 1 1 1 1
0 1 2 3	0 1 2 3	0 1 2 3 4 5 6 7 8 9 0 1 2 3 4 5 6 7 8	0 1 2 3 4 5 6 7 8 9 0 1 2 3 4 5 6 7 8
0 → N	0 → N	0 → N	0 → N
0 0 0 0	0 0 0 0	0 0 0 0	0 0 0 0
0 0 0 1	1 0 0 0 1	0 0 0 0	0 0 0 0
0 0 1 0	2 0 0 1 1	0 0 0 0	0 0 0 0
0 0 1 1	3 0 0 1 0	0 0 0 0	0 0 0 0
0 1 0 0	4 0 1 1 0	0 0 0 0	0 0 0 0
0 1 0 1	5 0 1 1 1	0 0 0 0	0 0 0 0
0 1 1 0	6 0 1 0 1	0 0 0 0	0 0 0 0
0 1 1 1	7 0 1 0 0	0 0 0 0	0 0 0 0
1 0 0 0	8 1 1 0 0	0 0 0 0	0 0 0 0
1 0 0 1	9 1 1 0 1	0 0 0 0	0 0 0 0
1 0 1 0	10 1 1 1 1	0 0 0 0	0 0 0 0
1 0 1 1	11 1 1 1 0	0 0 0 0	0 0 0 0
1 1 0 0	12 1 0 1 0	0 0 0 0	0 0 0 0
1 1 0 1	13 1 0 1 1	0 0 0 0	0 0 0 0
1 1 1 0	14 1 0 0 1	0 0 0 0	0 0 0 0
1 1 1 1	15 1 0 0 0	0 0 0 0	0 0 0 0

OR XOR	
0 0	0 0
0 1	1 1
1 0	1 1
1 1	1 0

FIG. 4A

FIG. 4B

Data Before Moduation	Data After Modulation
01	X01
10	010
11	X011
0001	X00001
0010	X00000
0011	010001
0000	010000

X is 1 when the bit after modulation is 0

FIG. 5

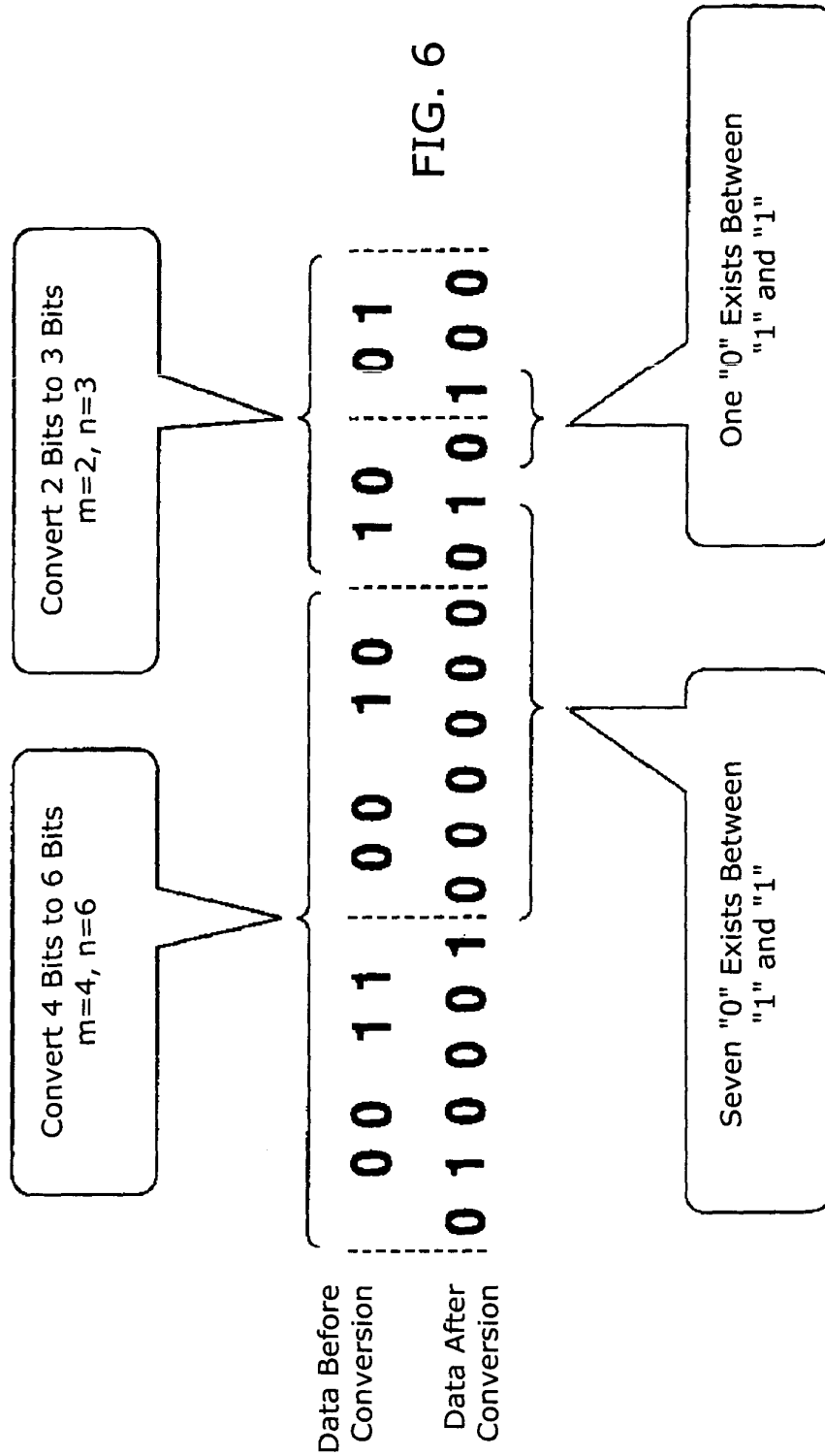


FIG. 7A

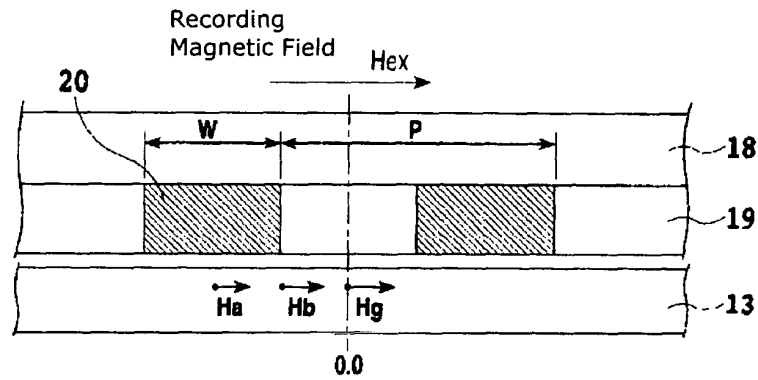


FIG. 7B

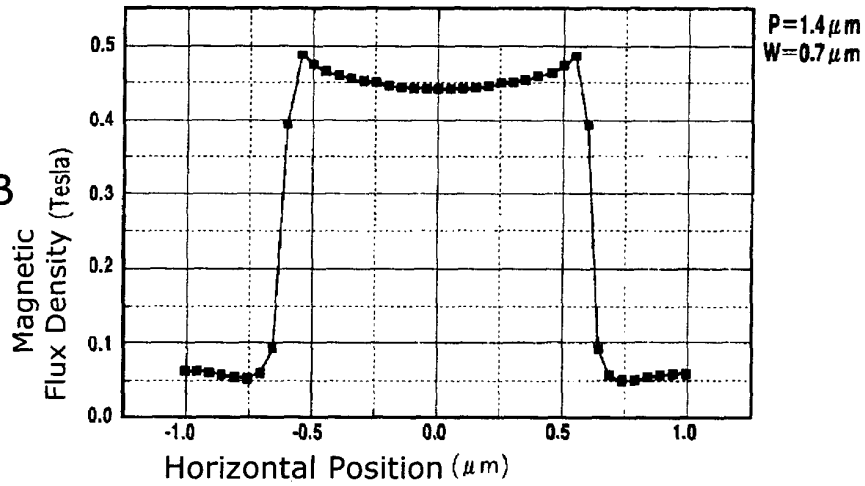


FIG. 7C

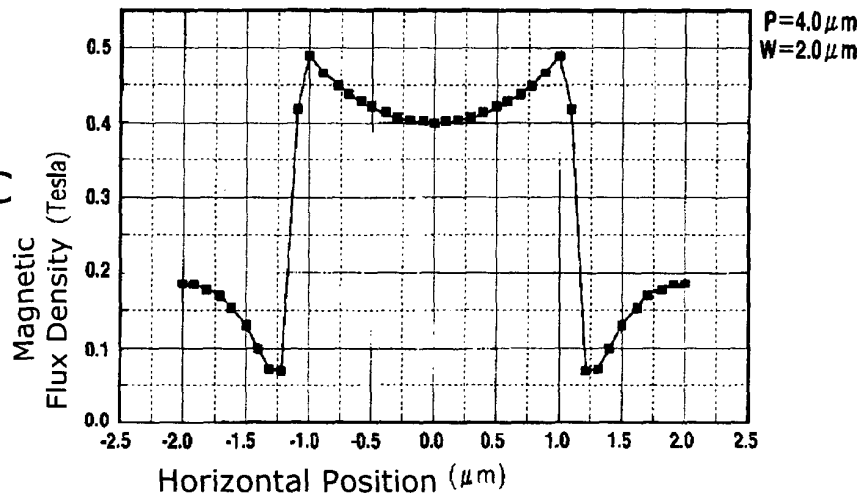


FIG. 8A

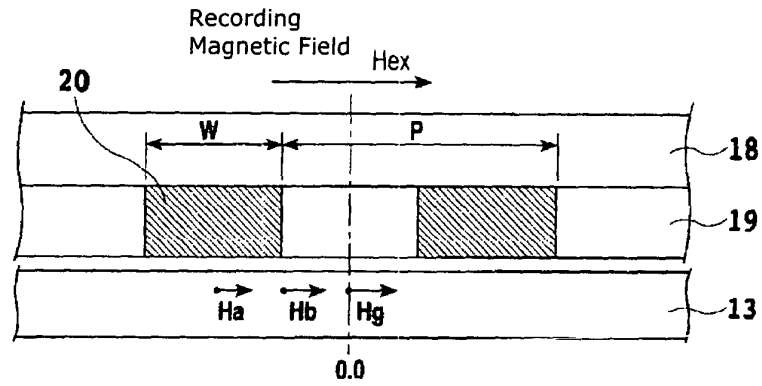


FIG. 8B

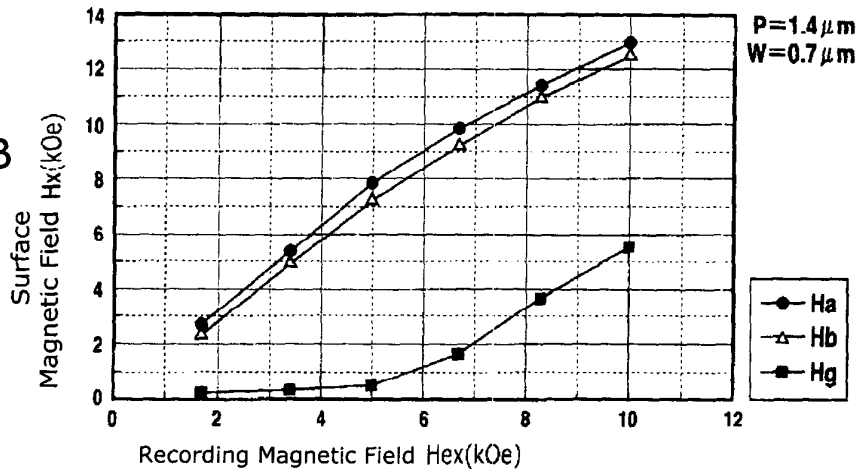


FIG. 8C

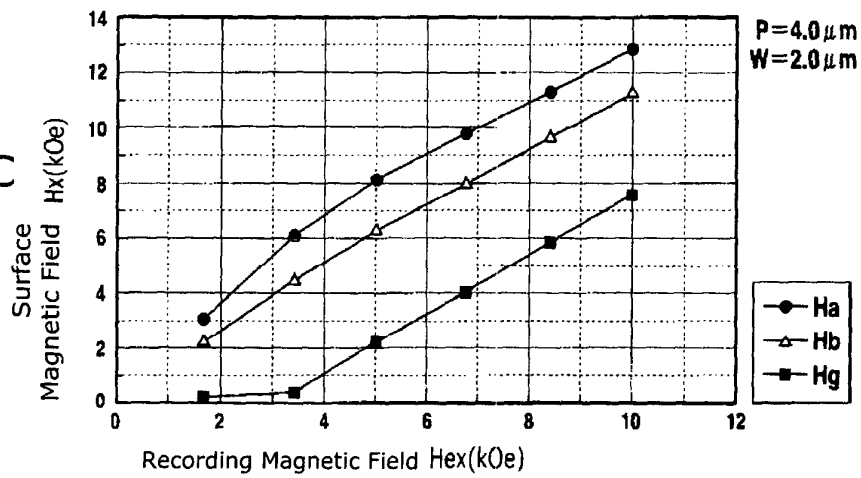
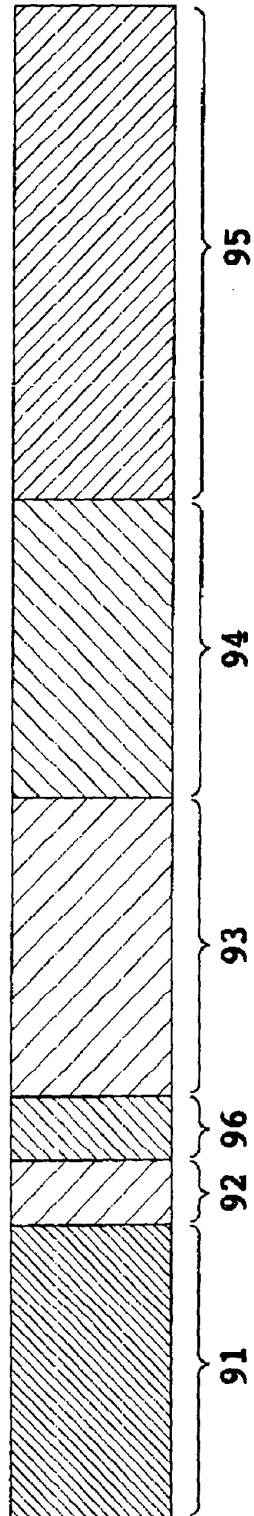


FIG. 9



[illegible]

CYL ID	0	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15		Data Inversion Location
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	→ N	7,14
	1	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	2	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	3	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	4	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	5	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	6	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	7	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14
	8	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	9	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	10	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	11	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	12	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	13	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	14	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
	15	0	0	0	0	0	0	1	1	1	1	1	1	1	0	0		7,14,14
247301	1	0	0	1	0	0	1	0	1	0	0	0	0	1	1	1		
247302	1	0	0	1	0	0	1	0	1	0	0	0	0	1	0	1		
247303	1	0	0	1	0	0	1	0	1	0	0	0	0	1	0	0		
247304	1	0	0	1	0	0	1	0	1	0	0	0	0	1	1	0		
247305	1	0	0	1	0	0	1	0	1	0	0	0	0	1	1	0		

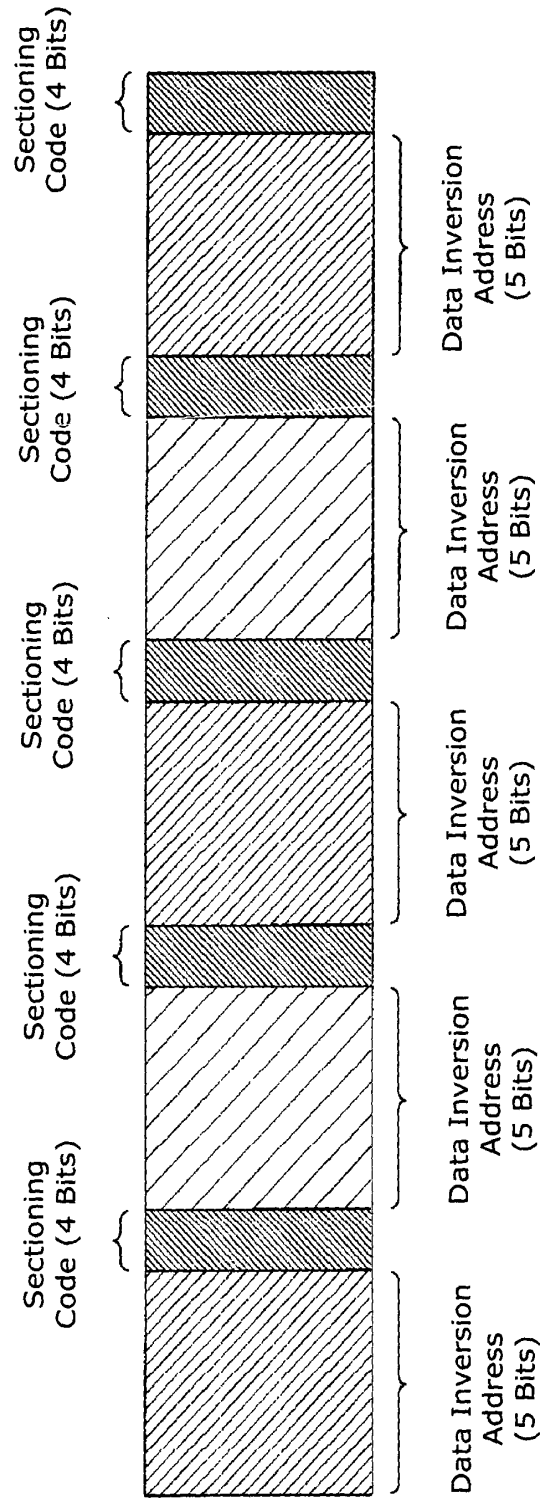


FIG. 11

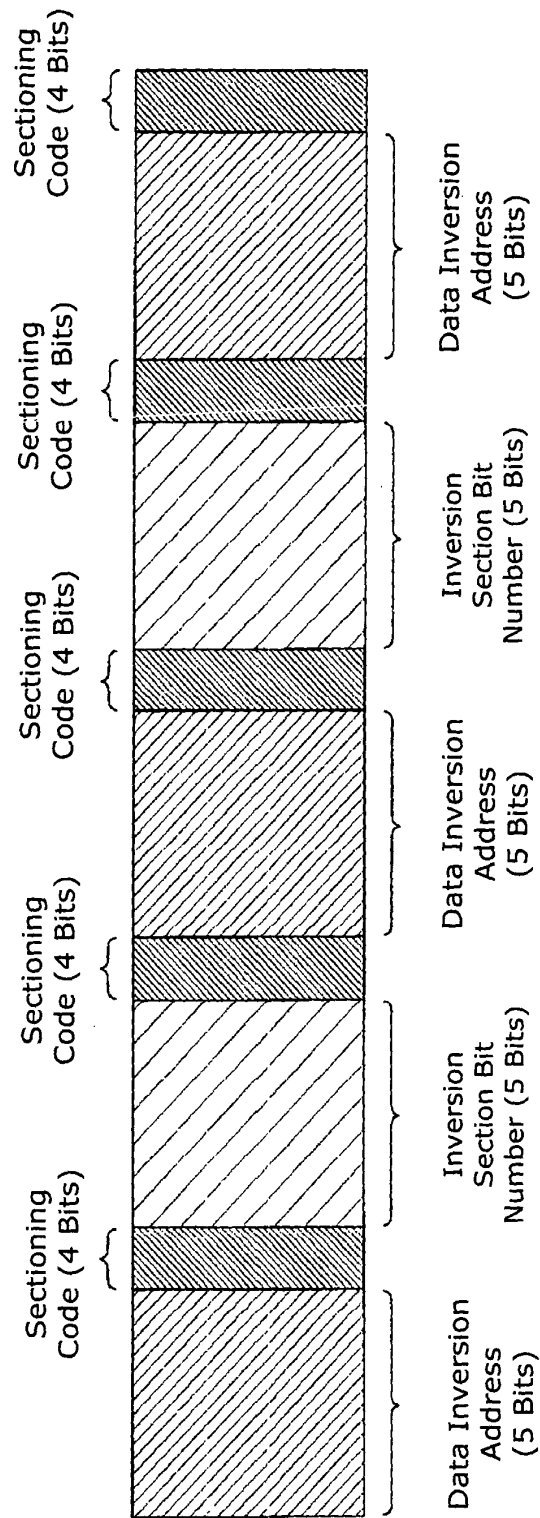


FIG. 12